PROSTETİK MİTRAL KAPAKLI HASTADA WARFARİN KULLANIMININ NEDEN OLDUĞU HEMORAJİK OVARİAN KİST RÜPTÜRÜ

Warfarin Induced Hemorrhagic Ovarian Cyst Rupture in a Patient With Prosthetic Mitral Valve

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ÖZET

Bu yazıda mekanik kapak replasmanının tromboembolik koplikasyonlarından korunmak amaçlı warfarin kullanan 31 yaşında kadın olgu sunulmuştur. Hasta acil servise uzamış menstrual kanama nedeniyle başvurdu. İlk fizik muayenesinde peritoneal irritasyon bulgusu ve karın ağrısı yoktu. Laboratuvar testlerinde azalmış hemoglobin düzeyi ve artmış INR (International Normalized Ratio) düzeyi saptandı. Hemoglobin düşüşünün devam etmesi üzerine çekilen batın ultrasonografisinde peritoneal hemoraji ve ovarian kist hematomu saptandı. Bu sebeple antikoagülan tedavi alan kadın hasta acil servise hemoglobin düşüklüğü ile başvurduğunda over kistine bağlı kanama olabileceği de düşünülmelidir.

Anahtar kelimeler: Mitral Kapak Replasmanı, Over Kist Rüptürü, Warfarin Kullanımı

ABSTRACT

A thirty-one years old woman is reported for hemorrhagic ovarian cyst rupture induced with warfarin use to prevent thrombo-embolic complications of mechanic heart valve. The patient attended to emergency service due to prolonged menstrual bleeding. The patient had no sign of peritoneal irritation in physical examination and she hadn't abdominal pain. Labaratory tests showed decreased hemoglobin and increased INR (International Normalized Ratio) levels. At the follow up, hemoglobin level continued to decrease and peritoneal hemorrhage and ovarian cyst hematoma was detected in the abdominal ultrasonography. Hence, when a woman taking anticoagulant therapy is referred to the emergency department with decreased hemoglobin level, ovarian cyst hemorrhage should also be considered.

Key words: Mitral Valve Replacement, Ovarian Cyst Rupture, Warfarin Use

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Introduction

Oral anticoagulants are frequently used for prevention of thrombo-embolic complications in prosthetic heart valve and other cardiovascular diseases such as atrial fibrillation and heart failure. The most important adverse effect of oral anticoagulant use is hemorrhage (1,2). When anticoagulant intensity is carefully monitored with International Normalized Ratio (INR) in patients taking warfarin, major hemorrhage risk is 0.3-0.5% per year. Warfarin induced bleeding is associated with intensity of the anticoagulation, underlying patient characteristics, and the duration of therapy. When targeted INR range 2.0-3.0, bleeding complications are lower than targeted INR>3.0 (2). We report a young woman with hemorrhagic ovarian cyst rupture who received warfarin for her mechanic heart valve.

Case Report

A thirty-one year old woman was admitted to the emergency department with complaint of prolonged menstrual bleeding (for six days) and new onset of weakness. The medical history comprised a mitral valve replacement because of rheumatic mitral valve disease two years ago. She was put on a long-term anticoagulant regimen of warfarin, 2.5 mg per day. Her blood pressure was 100/70 mmHg and heart rate was 82 per/min. Physical examination was normal. She hadn't abdominal pain and the examination was normal. Electrocardiography showed sinus rhythm. On admission, the laboratory findings were as follows: INR 4.7, prothrombin time 55 sn, hemoglobin 9.8 g/dL, hematocrit 29.5 %, platelet 301 K/uL, white blood cell count 5.1K/uL. Patient was hospitalized in cardiology clinic for elevated INR value. Since INR was elevated (INR = 4.7) and suspicion of bleeding ,one unite of fresh frozen plazma was given. Control INR was 2.1, prothrombin time was 25 sn and control hemoglobin was 7.2 g/dL. Patients menstrual bleeding was stopped after hospitalization to the cardiology clinic. Patient had no complaint about hematemesis, melena, hematochezia, hematuria, hemophytsis or abdominal pain.

Twelve hours later control hemoglobin was 6.4 g/dL, and INR was 1.9. Patients stool analysis was normal. Abdominal ultrasounography showed left ovarian hemorrhagic cyst with 45 mm diameter and abdominal free fluid. The patient referred to the gynecology clinic, two units of erythrocyte suspension were given to the patient. After three days of follow up the patients clinical findings were stabilized. At the time of discharge, hemoglobin level was 9.2 g/dL, INR was 2.2. One month later the cyst diameter was approximately 40 mm and bleeding was not observed.

Discussion

Although life threatening hemorrhage is the major complication of anticoagulant therapy, it is imperative for mechanic heart valves. There is a relationship between increased INR (a marker of anticoagulation intensity) and risk of hemorrhage in patients with mechanical heart valves (3,4). Therefore, woman in reproductive age who receives anticoagulant therapy the possibility of ovarian hemorrhage should be considered. Abnormal hemorrhage may occur despite of careful control. Ovarian hemorrhage and hemoperitoneum is rare but a serious complication of anticoagulant therapy (5,6).

Hemorrhagic complication of warfarin is associated with intensity of the anticoagulant effect, duration of therapy and patient characteristics. Hemorrhagic complication of warfarin increases when anticoagulated accessively (2-4). Minor hemorrhage are often safely managed by withholding or reducing warfarin dose in stable patients. If life threatening hemorrhage occurs it is important reversal of warfarin adverse effect timely. Fresh-frozen plasma, vitamin K and vitamin K-dependent coagulation factors II, VII, IX, and X are commonly administrated for urgent reversal of warfarin adverse effect (7,8).

Various hemorrhagic complications of warfarin are gastrointestinal bleeding, haematuria, haemoptysis, subarachnoid haemorrhage, intracranial bleedings, rectus sheat haematomas, retroperitoneal haematomas, epistaxis, oral cavity bleeding, haemarthrosis (9).

Uncontrolled warfarin therapy may cause serious, even life-threatening hemorrhagic complications. In our patient ovarian hemorrhage stopped spontaneously and operation was not necessary. In woman in reproductive age receiving warfarin therapy, ovarian hemorrhage and hemoperitoneum should be considered as a complication of anticoagulant therapy. Altough rare, it could be life threatening (5,6). The patient should be adequately informed about potential complications of warfarin and regular INR monitoring is necessary.

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